MICROCREDENTIALS IN COLLEGE POST-SECONDARY EDUCATION: WHAT'S IT ALL ABOUT

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ABSTRACT

Micro-credentials differ from traditional diplomas and degrees in that they are generally offered in shorter or more flexible timespans and tend to be more narrowly focused. In Ontario, their adoption has gained momentum as a result of the Ontario Government's initiatives focusing on helping people retrain and upgrade their skills to find new employment. Although no standard definition currently exists, it is generally accepted that micro-credentials are competency and skill-based, demonstrate a skill, experience, or knowledge in a particular subject and are developed in partnership with industry. The benefits of micro-credentials include customized, flexible learning tailored to meet an individual's needs, the opportunity for non-traditional learners to sample a piece of a program before committing. These microcredentials may provide portable, stackable, and shareable currency. Students may ultimately broker their education through digital badges and afford employers the ability to view, evaluate, verify, and compare the skills/competencies achieved.

KEYWORDS: microcredential, upskilling, credit, online delivery

INTRODUCTION

As stated earlier, no world wide standard regarding micro-credentials currently exists and may never exist. The key is that, at a minimum, the College should adopt the Ontario Government definition as well as implement a strategy that works for the College. As a result, micro-credentials can be defined and applied at differing levels at the College with each level building on the other as follows:

Level 1 – Continuing Education strategy, these micro-credentials would be of short duration, non-credit, in partnership with industry, and stackable to a certificate like existing programs. Further, this level would include programs currently offered through the Rapid Skills Incubator as well.

Level 2 – College wide strategy, these micro-credentials would include both credit or non-credit courses, competencies, and skills, and would be stackable to a certificate, diploma, or degree. Further, these micro-credentials would apply to all College programs.

In considering these two levels, Level 1 adopts the Ontario Government definition. However, there is an opportunity to go beyond the narrow focus of the Ontario Government definition and align the micro-credentialing strategy within a College's Strategy. Therefore, a micro-credentialing strategy should be adopted that encompasses all students, both continuing education and full-time, and provide a learning environment that is flexible, student-centered, and personalized, and which complements and expands on the existing framework.

The discussion surrounding micro-credentialing has arisen and gained momentum recently for several reasons:

1. The Ontario Government's initiative to provide rapid skills training programs to help people get the skills to find new employment and meet employers' needs.
2. The demand for shorter credentials focused on performance competencies aligned to knowledge and skills that complement traditional diplomas and degrees.
3. The need by employers to increase the skills of workers in a specific job area and/or function.
4. The need for stackable credentials that people can earn to build their skills.
5. The demand for online, personalized, and flexible learning options.
6. The capability of digital badges to provide detailed evidence online of competence learning such as assignments, projects, etc

All the above are leading to a credentialing environment that is multilayered, flexible, personalized, and stackable and which consists of both the traditional certificate/diploma/degree as well as short competency/skill-based programs developed in conjunction with industry.

What is a micro-credential?

Although no standard definition exists, it is generally accepted that microcredentials are a competency and skill-based form of credential that demonstrates skill, experience, or knowledge in a particular subject. A micro-credential is often referred to as a digital badge, open badge, nano degree, mini degree, or micro certifications. It should be noted however, that a micro-credential and a digital badge are two different things. A micro-credential verifies a person's knowledge or skill based on the completion of a course, activity, project, or practical component while a digital badge is an electronic icon that can be displayed, accessed, and verified online. Therefore, you can have a micro-credential without a digital badge. Further, it should be noted that a digital badge, which is displayed online, contains very specific information regarding the person who earned the micro-credential and about the micro-credential itself such as the following information:

- Digital badge earner
- Digital badge name
- Description which details the achievement, the context, completed tasks, assessment procedures, learning outcomes
- Criteria identifies the tasks set by the badge issuer and completed by the earner to qualify for the badge
- Issuer information
- Evidence to support the specific achievement /include text files, images, videos, etc
- Industry partner information, if applicable

Ontario Government Definition and Pilot Programs

The Ontario Government defines micro-credentials as rapid training programs offered by colleges, universities and Indigenous institutes across the province focusing on helping people retrain and upgrade their skills to find new employment. They have the following characteristics:

- take less time to complete than degrees or diplomas
- may be completed online and may include on-the-job training
- are created with input from business sectors, so the skills being taught match employer needs

To this end, the Ontario Government launched two micro-credential pilot programs in 2019: RapidSkills and eCampusOntario.

It should be noted that micro-credentials are not currently part of the Ontario Quality Framework (OQF). Peter Gooch and Associates (2020) in their research report prepared for eCampus titled Micro-certifications: Policy and Regulatory Context in Ontario state:

"The OQF includes certificates offered by colleges: Certificate 2 and Certificate 3. The purposes of both Certificate 2 and Certificate 3 is to prepare graduates for employment at entry-level positions or to prepare them to begin or continue postsecondary studies. Certificate 2 typically requires 240 to 500 hours of instruction, and Certificate 3 typically requires two semesters (or 600 to 700 hours) of instruction. Micro-certifications typically are of shorter duration and are intended to document achievement of specific skills and competencies. Micro-certifications, as they are evolving in the postsecondary sector, are not now included in the OQF".

The report also indicates that the OQF does not cover all credentials offered by Colleges specifically and specifically with reference to Continuing Education state:

"Colleges and universities offer many short programs or courses aimed at improving specific skills of professionals or practitioners, and also offer short programs or courses addressing a wide range of topics of interest to adults" (Gooch et al 2020).

Therefore, as per the above, and given that micro-certifications are typically shorter in duration, one can conclude that micro-credentialling programs fall within Continuing Education. Further, the same could be said for programs within the Rapid Skills Incubator.

Why Microcredentials Now?
Beyond the Ontario Government's focus on rapid training programs to help workers retrain and upgrade their skills to find new employment, the discussion regarding micro-credentials is taking traction for several reasons:
• online flexible learning
• developed in partnership with industry
• employers looking to identify competencies/skills of applicants beyond diploma/degrees
• digital badges allow employers to view and easily verify specific applicant skills/competencies
• digital badges detail knowledge and activities that were undertaken to achieve the competency/skill
• micro-credentials can represent not only a course but also projects, activity, work integrated learning, project, portfolio, or practical assessment

Gallagher & Maxwell (2019) in their paper on Community Colleges and the New Era of Work and Learning, highlight why recent changes in credentialing position colleges to be leaders in this market as follows:

"Changes in the credentialing market have produced a complex, multilayered ecosystem with a demand for shorter credentials that are focused around job market competencies. Community colleges are well positioned to lead this emerging market for three reasons. (1) Their dual mission to offer both traditional degrees and workforce development programs provides a competitive advantage in piloting and implementing many of the new types of credentials, especially those that can be embedded into traditional degree programs. (2) They have a long history in awarding certificates, one type of shorter work-aligned credential that is experiencing a new emphasis in today's market. (3) They have an established infrastructure, content knowledge experts, and employer relationships that can support a broad array of shorter credentials with a solid level of quality assurance. To play a central, even leading role, in the new credentialing market, community colleges must build credentials that respond to four growing trends and imperatives: building competency and market-oriented programs, structuring credentials to facilitate lifelong learning, unbundling learning in traditional degrees, and recognizing the need for quality assurance"(Gallagher and Maxwell 2019).

Discussion:
The framework being proposed by a number of government educational agencies has a narrow focus designed to help people retrain and upgrade their skills to find new employment. This model does not fit well within a College's full-time framework and is more suited for continuing education/professional development. However, there is an opportunity to take micro-credentials and leverage them, in a broader sense, to compliment ongoing programming. Some fundamental tenets that would define and help shape microcredentials are:
• Non-credit or credit
• Stackable
• Online delivery
• Part-time/flexible delivery
• Pathway into diploma/degree
• Post graduate
• Includes work integrated learning

The development of these skills and credentials does not fit within the academic divisions current business model and practice. It is suggested that the completed offerings could be delivered through Distance Education in Continuing Education.

Once it is determined which components will make up the micro-credential. There may be a number of permutations and combinations as to how one would derive credit for the microcredential. Below is a list of possibilities:

Initiative 1: non-credit
Initiative 2: non-credit/stackable to a certificate
Initiative 3: non-credit/stackable to a certificate /industry partnership
Initiative 4: credit/stackable to diploma
Initiative 5: credit/stackable to diploma/WIL
Initiative 6: credit/stackable to degree/industry partnership

Having identified and classified the right initiative will dictate a business model for the various academic divisions. Inclusion may be easily achieved once model is tested. A further business venture may also allow for the licensure of curriculum to other post secondary institutions.

Conclusion:
It is recognized that micro-credentials are gaining momentum and will play a major role in higher education. Micro-credentials should complement existing programs, provide students with greater flexibility and customization for program completion, and add a mixture of competency, skill, or project−based experience to a student's portfolio. Further, there is strong support for micro-credentials in industry as they allow prospective employers to delve deeper into an applicant's qualifications and experience as well as compare and verify them. The challenge moving forward, however, is that the College's current framework is not capable of handling micro-credentials and therefore, careful design and implementation is required to be ultimately successful. The time of change in post -secondary education is upon us. We truly do live in most interesting times.

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